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(54) Title: A METHOD FOR THE PRODUCTION OF EMULSION-BASED MICRO PARTICLES

(57) Abstract: The apparatus and methods of the present invention are of use for the production of emulsion-based microparticles containing a biological or chemical agent. In particular, the apparatus provides a vessel; packing material situated inside such vessel and may further provide material capable of insertion into both ends of said vessel for enclosure of the packing material. In a particular embodiment, the apparatus is a packed bed apparatus. The methods include production of emulsion based microparticles containing a biological or chemical agent. The usefulness of the present invention is that the apparatus and methods of the present invention provide for a low-shear, non-turbulent, production of emulsion-based microparticles that provides a narrow, reproducible, particle size distribution, capable of use with both large and small volumes that is capable of being conveniently scaled up while providing predictable emulsion properties.